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REMARKS

Reconsideration is respectfully requested in view of the above amendments and following remarks. Claims 10, 13 and 24 are amended. Claims 10 and 24 have been amended to recite "wherein M is 50 atomic % or more of Ba", as supported for example at page 18, lines 11-13. Claims 10, 13 and 24 have been amended to recite "0 ≤ x ", as supported for example at page 19, Table 1 and within specification. Claims 10 and 24 have been amended to incorporate the limitation " $x \le 0.7$ " as recited in canceled claim 12. Claim 13 has also been amended to depend from claim 10. Claims 1-9, 11, 12 and 20-23 have been canceled without prejudice or disclaimer. Claims 26-37 are new. Claim 26 incorporates limitations recited in canceled claims 1 and 8. Claims 27 tracks canceled claim 9. Claim 28 further limits M and Q. Claims 29 and 30 further limit Y and R respectively. Claim 31 incorporates limitations recited in canceled claim 7. Claim 32 incorporates limitations recited in canceled claim 32. Claim 33 incorporates limitations recited in canceled claim 1 and also recites "wherein the inorganic oxide has a hexagonal crystal structure or a peroskite structure", as supported for example at page 39, line 30 and page 40, line 25 respectively. Claim 34 further limits M and Ln. Claim 35 further limits R. Claim 36 further limits M and Ln. Claim 37 incorporates limitations recited in canceled claim 21. No new matter has been added. Claims 10, 13-19 and 24-37 are pending.

The drawings are objected to under 37 CFR 1.84(p)(5) because they include reference character 15 in Figs. 9A and 9B which is not mentioned in the description. Figs. 9A & 9B have

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been amended to remove reference character 15. No new matter has been added. Applicants respectfully requested withdrawal of the objection.

Claim rejections - 35 U.S.C. § 102

Claims 1-25 are rejected under 35 U.S.C. 102(b) as being anticipated by Verriet et al. (US 4,093,890). Applicants respectfully traverse the rejection.

Claims 10 and 24 are directed to a an inorganic oxide having the formula, (1-x)MLn₂QR₄O₁₂·xLn₃R₅O₁₂. Claims 10 and 24 require M is 50 atomic % or more Ba. Claim 33 is directed to an inorganic oxide having the formula MLn₂QR₄O₁₂. Claim 33 requires the inorganic oxide to have a hexagonal crystal structure or a pervoskite crystal structure.

Verriet teaches a terbium-activated luminescent material with garnet crystal structure satisfying the formula:

$$Ln_{3-x-p}Tb_p A_{5-x-2y} Me^{11}_{x+y}Me^{1V}_{x+y}O_{12}$$
 $0 \le x \le 2.8$
 $0 \le y \le 2.0$
 $0.4 \le x+y \le 2.8$
 $0.02 \le p \le 1.50$
 $x+p \le 3.0$

Ln represents yttrium, gadolinium and/or lutecium, A aluminium and/or gallium, Me^{II} magnesium, calcium, strontium and/or zinc, and Me^{IV} silicon, germanium and/or zirconium.

The terbium-activated luminescent material is useful in low pressure mercury vapor discharge lamps. Verriet teaches away from the use of barium as required by claim 1. Verriet discloses that barium appeared to be unsuitable although small quantities (for example up to 10 mole% of Me^{II}) do not disturb (col. 2, Il. 40-42). Verriet fails to teach or suggest M is 50 atomic % or more

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of Ba. Therefore, Verriet fails to anticipate claims 10 and 24. Verriet also fails to teach or

suggest the inorganic oxide has a hexagonal crystal structure or a perovskite structure.

Therefore, Verriet also fails to anticipate claim 33. Withdrawal of the rejection is respectfully

requested.

Claims 13-19 and 26-32 depend either directly or indirectly from claim 10. Claim 25

depends from claim 24. Claims 34-37 depend from claim 33. For the reasons discussed above

for claims 10, 24 and 33, withdrawal of the rejection is respectfully requested.

In view of the above, favorable reconsideration in the form of a notice of allowance is

requested. Any questions or concerns regarding this communication can be directed to the

undersigned attorney, Douglas P. Mueller, Reg. No. 30,300, at (612)371.5237.

Respectfully submitted,

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Dated: January 19, 2005

В

DPM:smm

23552

PATENT TRADEMARK OFFICE

Douglas P. Muelle

Reg. No. 30,300

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Amendments to the Drawings

The attached drawing sheet includes changes to Figs. 9A & 9B. In particular, reference character has been deleted from Figs. 9A & 9B.

Attachment: Replacement Sheets